

MINIMUM AND MAXIMUM OPERATIONS TO FACILITATE INTERVAL MULTIPLICATION AND/OR INTERVAL DIVISION

ABSTRACT

One embodiment of the present invention provides a system for performing a minimum/maximum computation for an interval operation. The system operates by receiving at least four floating-point numbers, including a first floating-point number, a second floating-point number, a third floating-point number and a fourth floating-point number. Next, the system computes a minimum/maximum of the at least four floating-point numbers, wherein if the at least four floating-point numbers include one or two default NaN (not-a-number) values and the remaining values are not default NaN values, the default NaN values are ignored in computing the minimum/maximum.